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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|----------------------------|-------------------------------|----------------------|------------------------------|------------------|
| 10/599,845 | 10/11/2006 | Seiichi Yamamoto | 19415-019US1 PCT-05R-207/ | 5460 |
| 26211 FISH & RICHA | 7590 01/09/200 ARDSON P.C. | EXAMINER | | |
| P.O. BOX 1022 | | MCCLOUD, RENATA D | | |
| MINNEAPOLIS, MN 55440-1022 | | | ART UNIT | PAPER NUMBER |
| | | | 2837 | |
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| | | | NOTIFICATION DATE | DELIVERY MODE |
| | | | 01/09/2009 | ELECTRONIC |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

PATDOCTC@fr.com

| | Application No. | Applicant(s) | | | | | |
|--|--|--|--|--|--|--|--|
| Office Action Comments | 10/599,845 | YAMAMOTO, SEIICHI | | | | | |
| Office Action Summary | Examiner | Art Unit | | | | | |
| | RENATA MCCLOUD | 2837 | | | | | |
| The MAILING DATE of this communication app Period for Reply | pears on the cover sheet with the c | orrespondence address | | | | | |
| A SHORTENED STATUTORY PERIOD FOR REPL' WHICHEVER IS LONGER, FROM THE MAILING D. - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period of Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tinwill apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE | lely filed the mailing date of this communication. (35 U.S.C. § 133). | | | | | |
| Status | | | | | | | |
| 1)⊠ Responsive to communication(s) filed on <u>08 S</u> | entember 2008 | | | | | | |
| | action is non-final. | | | | | | |
| <i>i</i> | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is | | | | | | |
| | closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. | | | | | | |
| · | 27 parto gaayro, 1000 0.2. 11, 10 | 0.0.210. | | | | | |
| Disposition of Claims | | | | | | | |
| 4)⊠ Claim(s) <u>1-8</u> is/are pending in the application. | ☑ Claim(s) <u>1-8</u> is/are pending in the application. | | | | | | |
| 4a) Of the above claim(s) is/are withdraw | 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | | |
| 5) Claim(s) is/are allowed. | | | | | | | |
| 6)⊠ Claim(s) <u>1-8</u> is/are rejected. | 6)⊠ Claim(s) <u>1-8</u> is/are rejected. | | | | | | |
| 7) Claim(s) is/are objected to. | | | | | | | |
| 8) Claim(s) are subject to restriction and/o | 8) Claim(s) are subject to restriction and/or election requirement. | | | | | | |
| Application Papers | | | | | | | |
| 9)☐ The specification is objected to by the Examiner. | | | | | | | |
| 10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner. | | | | | | | |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | | | |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). | | | | | | | |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. | | | | | | | |
| Priority under 35 U.S.C. § 119 | | | | | | | |
| | | | | | | | |
| 2) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). | | | | | | | |
| , , , | a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. | | | | | | |
| | | | | | | | |
| <u> </u> | 2. Certified copies of the priority documents have been received in Application No | | | | | | |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage | | | | | | | |
| application from the International Bureau (PCT Rule 17.2(a)). | | | | | | | |
| * See the attached detailed Office action for a list of the certified copies not received. | | | | | | | |
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| Attachassatta | | | | | | | |
| Attachment(s) 1) Notice of References Cited (RTO 902) 1) Intension Cumment (RTO 442) | | | | | | | |
| 1) Notice of References Cited (PTO-892) A) Interview Summary (PTO-413) Discrete of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date | | | | | | | |
| 3) Information Disclosure Statement(s) (PTO/SB/08) 5) Notice of Informal Patent Application | | | | | | | |
| Paper No(s)/Mail Date 6) Other: | | | | | | | |

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DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-8 rejected under 35 U.S.C. 102(e) as being anticipated by Yashohara et al (US 7362061).

Claims 1,3,7: A motor drive circuit comprising: a PWM voltage generation circuit (50) for generating a PWM voltage; and a PWM drive circuit (20) for driving a motor based on the PWM voltage outputted from the PWM voltage generation circuit (50), wherein the PWM drive circuit includes a load driving field-effect transistor (2a), a through rate control portion (3a1/3a2) for reducing a through rate of a voltage based on the PWM voltage and then feeding the resultant voltage to a gate of the load driving field-effect transistor, and a gate voltage control portion (3a5) for stopping an operation of the through rate control portion and pulling up or down a gate potential of the load driving field-effect transistor to a predetermined value upon detecting during a transition period of a gate voltage of the load driving field-effect transistor that an output voltage of the load driving field-effect transistor has almost been inverted and become approximately equal to a value obtained when the load driving field-effect transistor is completely on (col. 6:45-7:26).

Claims 2,4,8: as a result of detection of the PWM voltage and the output voltage of the load driving field-effect transistor, only when a value of the PWM voltage is found to be at a level at which the load driving field-effect transistor is turned on and the output voltage of the load driving field-effect transistor is found to be approximately equal to a value obtained when the load driving field-effect transistor is completely on, the gate voltage control portion stops the operation of the through rate control portion and pulls up or down the gate potential of the load driving field-effect transistor to the predetermined value (col. 6:45-7:26; col. 9:55-11:5).

Claims 5-6: a PWM generation circuit generates the PWM voltage according to a rotor position of the motor (col. 10:14-25).

Response to Arguments

3. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to RENATA MCCLOUD whose telephone number is (571)272-2069. The examiner can normally be reached on Mon.- Fri. from 5:30 am - 2pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Walter Benson can be reached on (571) 272-2800 ext. 37. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Renata McCloud/ Examiner, Art Unit 2837